

Nucleotide sequence of coding sequence encoding hTid1L:

ATGgctgcgcggtgctccacacgctggttgctggtggttgtggggaccccgcggctgccggctatatcgggtagaggggc ccggccgcccagggagggcgtggtgggggcatggctgagccgcaagctgagcgtccccgcctttgcgtcttccctgacct cttgcggcccccgagcgctgctgacattgagacctggtgtcagccttacaggaacaaaacataaccctttcatttgtact gcctccttccacacgagtgcccctttggccaaagaagattattatcagatattaggagtgcctcgaaatgccagcagaa agagatca agaagcct attat cagctt gcca agaagt at caccct gacaca aataaggat gatccca aagcca aggagaagttctcccagctggcagaagcctatgaggttttgagtgatgaggtgaagaggaagcagtacgatgcctacggctctgca ggcttcgatcctggggccagcggctcccagcatagctactggaagggaggccccactgtggaccccgaggagctgttcag gaagatetttggegagtteteatectetteatttggagattteeagacegtgtttgateageeteaggaataetteatgg agttgacattcaatcaagctgcaaaggggtcaacaaggagttcaccgtgaacatcatggacacgtgtgagcgctgcaacggcazggggaacgagcccggcaccaaggtgcagcattgccactactgtggcggctccggcatggaaaccatcaacacagq cccttttgtgatgcgttccacgtgtaggagatgtggtggccgcgggctccatcatcatcaccctgtgtggtctgcaggg gagcaggacaagccaagcagaaaaagcgagtgatgatccctgtgcctgcaggagtcgaggatggccagaccgtgaggatg cctgtgggaaaaagggaaattttcattacgttcagggtgcagaaaagccctgtgttccggagggacggcgcagacatcca ctccgacctctttatttctatagctcaggctcttcttgggggaacagccagagcccagggcctgtacgagacgatcaacg tacggagaccactacatccacatcaagatacgagttccaaagaggctaacgagccggcagcagagcctgatcctgagcta cgccgaggacgagacagatgtggaggggacggtgaacggcgtcaccctcaccagctctggtggcagcaccatggatagct ccgcaggaagcaaggctaggcgtgaggctgggggaggacgaggggattcctttccaaacttaagaaaatgtttacctca TGA

Nucleotide sequence of coding sequence encoding hTid1S:

atggctgcGcggtgctccacacgctggttgctggttgtgggggaccccgcgggctgccggctatatcgggtagaggggc $\verb|coggccgcccagggagggagggggggatggctgagccgcaagctgagcgtccccgcctttgcgtcttccctgacct|$ cttgcggcccccgagcgctgctgacattgagacctggtgtcagccttacaggaacaaaacataaccctttcatttgtact agagatcaagaaagcctattatcagcttgccaagaagtatcaccctgacacaaataaggatgatcccaaagccaaggaga agtteteceagetggeagaageetatgaggttttgagtgatgaggtgaagaggaageagtaegatgeetaeggetetgea ggcttcgatcctggggccagcggctcccagcatagctactggaagggaggccccactgtggaccccgaggagctgttcag gaagatctttggcgagttctcatcctcttcatttggagatttccagaccgtgtttgatcagcctcaggaatacttcatgg agttgacattcaatcaagctgcaaaggggtcaacaaggagttcaccgtgaacatcatggacacgtgtgagcgctgcaac ggcaaggggaacgagcccggcaccaaggtgcagcattgccactactgtggcggctccggcatggaaaccatcaacacagg cccttttgtgatgcgttccacgtgtaggagatgtggtggccgcggctccatcatcatctcgccctgtgtggtctgcaggg gagcaggacaagccaagcagaaaaagcgagtgatgatccctgtgcctgcaggagtcgaggatggccagaccgtgaggatg cctgtgggaaaaagggaaattttcattacgttcagggtgcagaaaagccctgtgttccggagggacggcgcagacatcca ctccgacctctttatttctatagctcaggctcttcttgggggaacagccagagcccagggcctgtacgagacgatcaacg tacggagaccactacatccacatcaagatacgagttccaaagaggctaacgagccggcagcagagcctgatcctgagcta cgccgaggacgagacagatgtggaggggacggtgaacggcgtcaccctcaccagctctggAAAAAGATCCACTGGAAACT

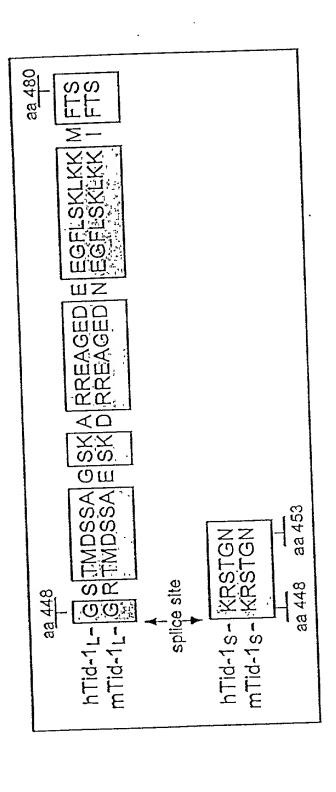
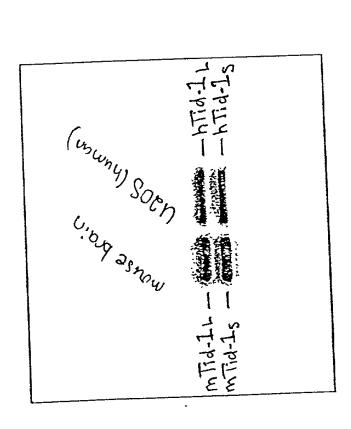
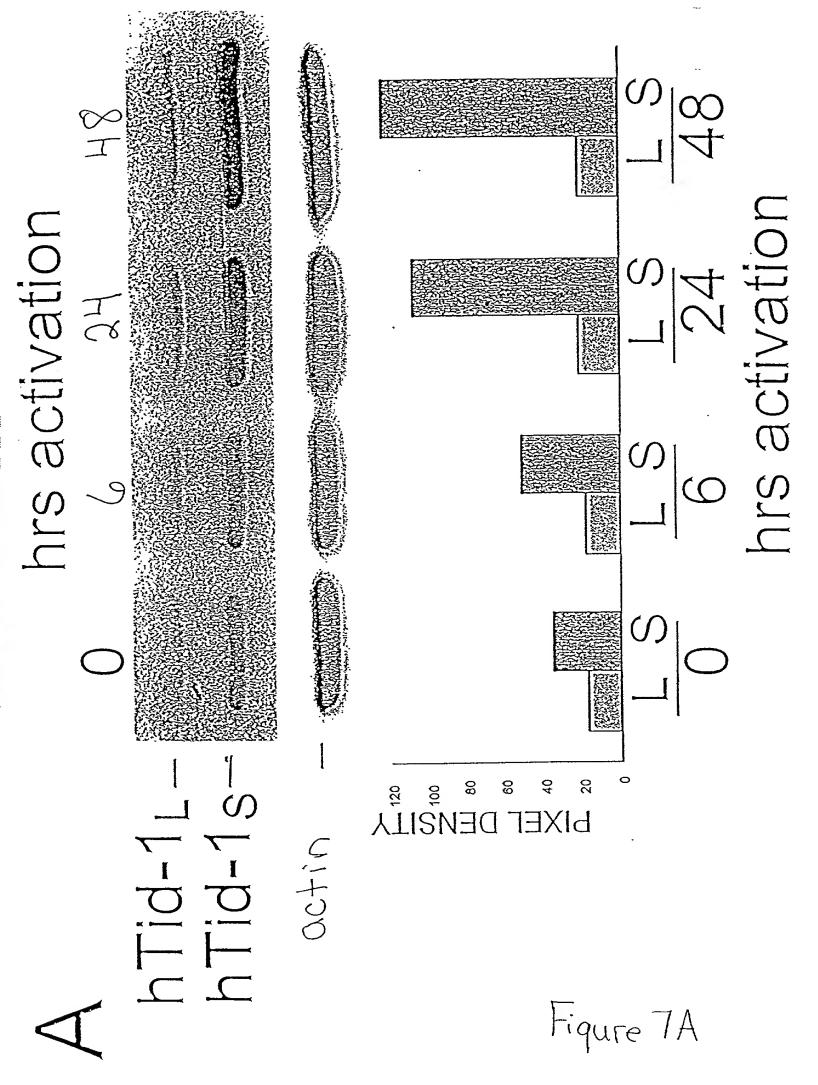


Figure 6





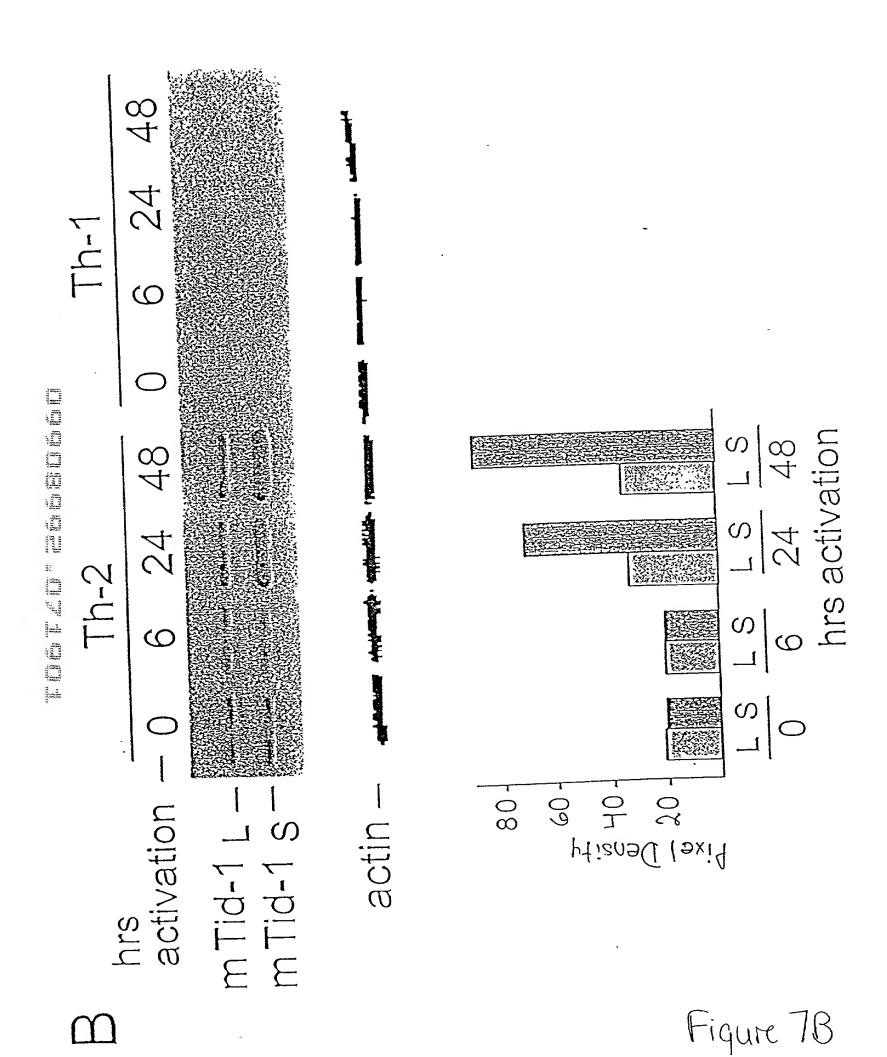


Figure 7C

 \bigcirc

Houg protein Tha/D10 80 ug protein HC 9 Th1/D5 mTid-11

Figure 7D

DO. 10. 11 primary Tha cells

Figure 7E

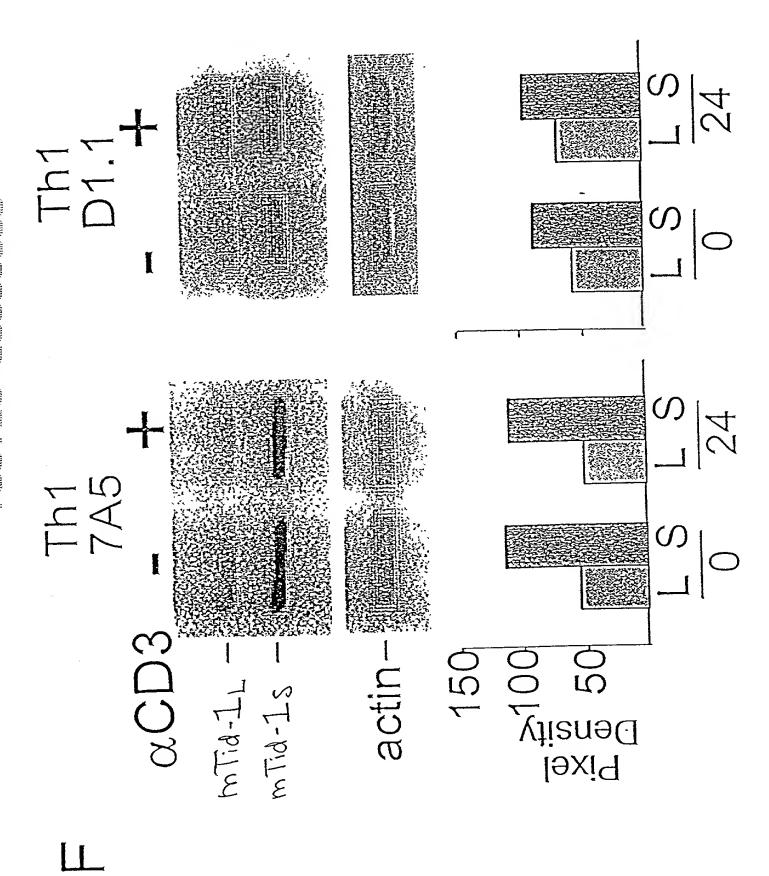
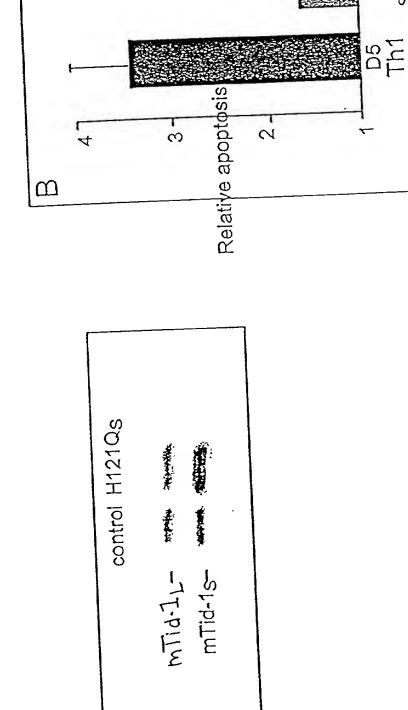


Figure 7F (part 1)





 \triangleleft

Figure 8

H1210s

Th2

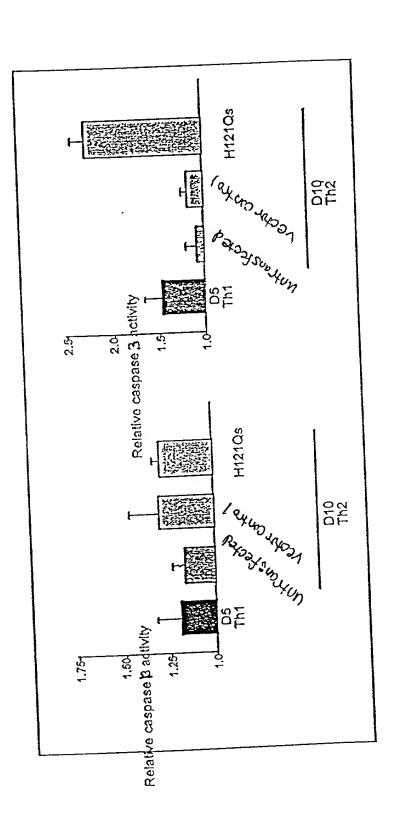


Figure .9

Amino acid sequence of mTid-1L:

Amino acid sequence of mTid-1S:

Liver
Brain
Lung
Kidney
Spleen
Testis
Ovary
Heart
Heart
Pancreas

Expression of the TID1 proteins in different tissues - cox2 is a marker for mitochondria